Before the Federal Communications Commission Washington, D.C. 20554

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In the Matter of)
PANAMSAT LICENSEE CORPORATION) File No. SAT-LOA-19990126-00018
Application for Authority to Launch and)
Operate a Hybrid Replacement Fixed Satellite Service Space Station)
)

ORDER AND AUTHORIZATION

Adopted: November 13, 2000 Released: November 14, 2000

By the Chief, Satellite and Radiocommunication Division:

I. INTRODUCTION

1. By this Order, we grant PanAmSat Licensee Corporation (PanAmSat) authority to launch and operate the PAS-1R replacement satellite at the 45° W.L. orbit location. Grant of this application will permit PanAmSat to replace the PAS-1 satellite that is reaching the end of its design life, thereby ensuring continuation of service to the public and increased service reliability.

II. BACKGROUND

- 2. PanAmSat requests authority to launch and operate its PAS-1R satellite at the 45° W.L orbit location currently occupied by the PAS-1 satellite. According to PanAmSat, replacement of PAS-1 is necessary because it is reaching the end of its design life. Once PAS-1R is placed in service and becomes operational at 45° W.L., PAS-1 will be turned off and will serve as an in-orbit spare.
- 3. PanAmSat states that PAS-1R, like PAS-1, will operate in both C and Ku band frequencies. PAS-1R will receive communications in the 13.75-14.5 GHz and 5925-6425 MHz frequency bands and transmit in the 11.45-11.95 GHz, 10.95-11.2 GHz and 3700-4200 MHz frequency bands. PAS-1R will provide video, audio and data services between and among countries in North and South America, the Caribbean, Africa and

Letter from Joseph A. Godles, Esq., Attorney for PanAmSat Licensee Corp. to Magalie Salas, Secretary, FCC (October 10, 2000).

Europe. PAS-1R is scheduled for launch on November 14, 2000. Columbia Communications Corporation (Columbia) filed comments, but did not oppose, PanAmSat's application.

III. DISCUSSION

- 4. We find that PanAmSat is legally, financially, technically and otherwise qualified to launch and operate the PAS-1R satellite and that a grant of its application will serve the public interest.² PanAmSat's legal qualifications are a matter of record and the Commission has on several occasions found that PanAmSat possesses the necessary legal qualifications to be a Commission licensee. With respect to financial qualifications, PanAmSat provided a balance sheet and income statements of its parent, Hughes Electronic Corporation ("HEC"), demonstrating adequate funds to finance the construction, launch, and operation for one year of PAS-1R. HEC's balance sheet as of December 31, 1998 shows total current assets of \$3.8 billion which is more than adequate to cover PanAmSat's estimated cost of \$260 million to construct, launch, and operate PAS-1R for one year.³ Further, we find that PAS-1R complies with all Commission technical requirements. We also note that the 11.45-11.7 GHz frequency band in which PanAmSat proposes to operate is allocated to the terrestrial and Fixed-Satellite Service ("FSS") on a co-primary basis.⁴ FSS operations in this band, however, are limited in the United States to international service.⁵
- 5. PanAmSat also proposes that PAS-1R operate in the 13.75-14.0 GHz frequency band. The 13.75-14.0 GHz band has been allocated domestically and internationally to the fixed-satellite service (FSS), subject to restrictions embodied in certain footnotes to the regulations. In particular, footnotes S5.502, S5.503, and S5.503A to the International Telecommunication Union (ITU) Radio Regulations place certain

See Licensing Space Stations in the Domestic Fixed-Satellite Service, 58 R.R.2d (P&F) 1267, 1272-3 (1985) (1985 Orbit Assignment Order).

An applicant relying on internal financing must submit a balance sheet documenting current assets and operating income sufficient to cover its costs. Current assets -- which include cash, inventory, and accounts receivable -- provide a general measure of a company's ability to raise funds on the basis of its ongoing operations. See 47 C.F.R. § 25.114(c)(13); 1985 Orbit Assignment Order at 1272.

See 47 C.F.R. § 25.208(b). Allocation of a given frequency band for a particular service on a primary basis entitles operators to protection against harmful interference from stations of "secondary" services. Further, secondary services cannot claim protection from harmful interference caused by stations of a primary service. See 47 C.F.R. §§ 2.104(d) and 2.105(c).

Use of the band by the FSS domestically in the United States is subject to certain restrictions. Specifically, Non-Government footnote NG104 to the U.S. Table of Frequency Allocations states that the use of the bands 10.7-11.7 GHz in the fixed-satellite service is limited to international systems, i.e. "other than domestic systems." The Commission interpreted this language to mean that U.S.-licensed systems may use the 10.7-11.7 GHz band to provide international service only. *See* PanAmSat Licensee Corp., DA 99-948 (released May 18, 1999).

restrictions on FSS operations. ⁶ Domestically, footnote US337 to 47 C.F.R. § 2.106 requires that earth stations operating in the 13.75-13.80 GHz band through the National Telecommunications and Information Administration (NTIA) Interdepartment Radio Advisory Committee's Frequency Assignment Subcommittee to minimize interference to the forward space-to-space link of the National Aeronautics and Space Administration Tracking and Data Relay Satellite System. In this regard, we have received a letter from the NTIA requesting that we identify these requirements in any grant of authority to operate a satellite in the 13.75-14.0 GHz band. ⁷ We, therefore, will require that the operations of the PAS-1R satellite in the band 13.75-14.0 GHz be consistent with these international and domestic regulatory footnotes.

- 6. Columbia asks that any grant to PanAmSat "be conditioned upon PanAmSat's coordination with Columbia to avoid any adverse impact on Columbia." Columbia currently operates C-band transponders on the NASA TDRS-6 satellite at 47° W.L. and has been granted authority to construct, launch and operate a new C-band satellite at 47° W.L. PanAmSat opposes the imposition of any conditions on its license to coordinate with Columbia. As for Columbia's current operations, PanAmSat states that Columbia is operating pursuant to Special Temporary Authority, which was granted on a non-interference basis. With respect to Columbia's future operations, PanAmSat notes that PAS-1R will operate two degrees away from the 47° W.L. orbital location authorized to Columbia.
- 7. We will not specifically condition PanAmSat's authorization to launch and operate its PAS-1R satellite on coordination with Columbia. The Commission has stated that its two-degree spacing policy is the cornerstone of our domestic orbital assignment plan for Fixed Satellite Service (FSS) in geostationary satellite orbits. ¹¹ The Commission

In particular, footnote S5.502 to the International Radio Regulations places certain restrictions on the minimum equivalent isotropically radiated power ("e.i.r.p.") and minimum antenna size for earth stations operating in the 13.75-14.0 GHz band. Footnote S5.503 limits FSS earth station e.i.r.p. spectral density in the 13.772-13.778 GHz band until those geostationary space stations in the space research service for which advance publication information was received by the ITU prior to 31 January 1992 cease to operate in this band. Footnote S5.503A states that: "Until 1 January 2000, stations in the fixed-satellite service shall not cause harmful interference to non-geostationary space stations in the space research and Earth exploration-satellite services. Additionally, when planning earth stations in the fixed-satellite service to be brought into service between 1 January 2000 and 1 January 2001, in order to accommodate the needs of spaceborne precipitation radars operating in the band 13.793-13.805 GHz, advantage should be taken of the consultation process and the information given in Recommendation ITU-R SA.1071."

See letter from William Hatch, Acting Associate Administrator, Office of Spectrum Management, NTIA, to Roderick Porter, Acting Chief, International Bureau, FCC (May 11, 1999).

⁸ Columbia Comments, p. 1, note 1.

⁹ Columbia Communications Corporation, 14 FCC Rcd 3318 (1999).

Columbia Communications Corporation, 11 FCC Rcd 8639 (1996).

Licensing of Space Station in the Domestic Fixed-Satellite Service, 54 Rad. Reg. 2d (P&F) 577, 589 (1983). The Commission's DISCO I decision made two-degree spacing applicable to applications

has repeatedly stated that it expects licensees to bear the responsibility of coordinating adjacent satellites pursuant to the two-degree spacing requirement because they are in the best position to determine the technical and economic tradeoffs inherent in reaching a coordination agreement. ¹² The Commission has also stated that it does not become involved in these coordination efforts unless the parties are unable to reach an agreement and request that we participate. ¹³ In this instance, we see no need to condition PanAmSat's license on coordination with Columbia's future satellite 47° W.L. There is two-degree spacing between these satellites and we expect the parties to comply with the full range of rules governing two-degree spacing and to coordinate the operation of these satellites. Absent a request for intervention, there is no reason at this time for the Commission to become involved in the coordination of these satellites.

IV. ORDERING CLAUSES

- 8. Accordingly, IT IS ORDERED that PanAmSat's application File No. SAT-LOA-19990126-00018 IS GRANTED and PanAmSat is authorized to launch and operate its PAS-1R satellite at 45° W.L. in accordance with the terms, conditions, and technical specifications set forth in its application and this Order.
- 9. IT IS FURTHER ORDERED that, PanAmSat shall prepare the necessary information, as may be required, for submission to the ITU to initiate and complete the advance publication, international coordination, and notification process of this space station in accordance with the ITU Radio Regulations. We also remind all licensees that no protection from interference caused by radio stations authorized by other administrations is guaranteed unless coordination procedures are timely completed or, with respect to individual administrations, by successfully completing coordination agreements. Any radio station authorization for which coordination has not been completed may be subject to additional terms and conditions as required to effect coordination of the frequency assignments of other administrations. *See* 47 C.F.R. § 25.111(b).
- 10. IT IS FURTHER ORDERED that the operation of the PAS-1R satellite network in the 13.75-14.00 GHz band shall be in accordance with footnotes S5.502, S5.503, and S5.503A to the ITU Radio Regulations.
- 11. IT IS FURTHER ORDERED that, pursuant to footnote US337 to 47 C.F.R. § 2.106, PanAmSat is required to coordinate the operation of the PAS-1R network

seeking orbital assignments outside of the traditional domestic arc. See Amendment to the Commission's Regulatory Policies Governing Domestic Fixed Satellites and Separate International Satellite Systems, Report and Order, 11 FCC.Rcd. 429 (1996) ("DISCO I").

See, e.g. Assignment of Orbital Locations to Space Stations in the Domestic Fixed-Satellite Service, 5 FCC Rcd 179, 181 (1990).

¹³ *Id*.

in the 13.75-13.8 GHz band through NTIA's Interdepartment Radio Advisory Committee's Frequency Assignment Subcommittee to minimize interference to the forward space-to-space link of the National Aeronautics and Space Administration Tracking and Data Relay Satellite System

- 12. IT IS FURTHER ORDERED that the operation of the PAS-1R satellite network in the 11.45-11.7 GHz band is limited in the United States to international operations in accordance with NG104.
- 13. IT IS FURTHER ORDERED that pursuant to footnore S5.441, the operation of the PAS-1R satellite network in the 10.95-11.2 GHz band shall be in accordance with Appendix 30B/S30B of the ITU Radio Regulations.
- 14. IT IS FURTHER ORDERED that PanAmSat is obliged to comply with the applicable laws, regulations, rules, and licensing procedures in those countries it proposes to serve.
- 15. IT IS FURTHER ORDERED that the license term for the PAS-1R satellite is ten years and will begin to run on the date the licensee certifies to the Commission that the satellite has been successfully placed into orbit and its operation fully conforms to the terms and conditions of this authorization.
- 16. PanAmSat is afforded thirty days from the date of release of this order and authorization to decline this authorization as conditioned. Failure to respond within this period will constitute formal acceptance of the authorization as conditioned.
- 17. This Order is issued pursuant to Section 0.261 of the Commission's rules on delegated authority, 47 C.F.R. § 0.261, and is effective upon adoption. Petitions for reconsideration under Section 1.106 or applications for review under Section 1.115 of the Commission's rules, 47 C.F.R. §§ 1.106, 1.115, may be filed within 30 days of the date of the release of this order (see 47 C.F.R. § 1.4(b)(2)).

FEDERAL COMMUNICATIONS COMMISSION

Thomas S. Tycz Chief Satellite and Radiocommunication Division